

ABSTRACT

A kinematic speed controller for a vehicle requires the constant deliberate movement of a rotary apparatus which is physically independent from the vehicle drive system. It does not require substantial operator muscle power since there is no direct mechanical connection between the kinematic controller and the vehicle drive system. The rotary apparatus which controls the vehicle speed may be a foot pedal and crank assembly. Additionally, the invention may include a variable degree of resistance to the rotary input device to enhance operator control or to provide muscle exercise for the operator if desired. Furthermore, the invention may include the variable setting of the relationship between the speed of the rotary input device and the amount of power provided to drive the vehicle and hence the speed of the vehicle. The components of the invention may be arranged to visually simulate a bicycle-type mechanical chain drive. The speed controller is preferably connected to an electrical generator which through appropriate circuitry controls the amount of power delivered to a drive motor from batteries. A simple electrical key switch may be utilized to completely disable the operation of the vehicle.